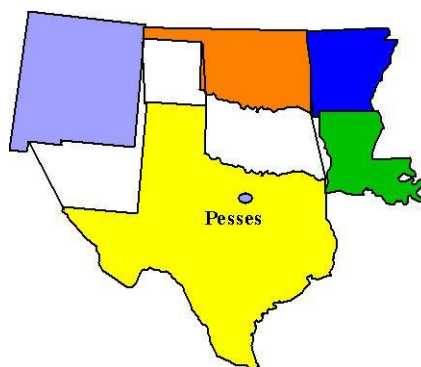


**PESSSES CHEMICAL CO.  
SUPERFUND SITE  
Tarrant County, Texas**

**EPA Region 6  
EPA ID: TXD980699656  
Site ID: 0602800  
U.S. Congressional District: 33**

**Contact: Gary Miller 214-665-8318  
Updated: June 2013**



## **Background**

---

The Pesses Chemical Company Superfund Site is located at 2301 South Main Street in Fort Worth in Tarrant County, Texas. The Site is triangular in shape and approximately 4.2 acres in size about two miles south of downtown Fort Worth and one-half mile west of Interstate 35W. The former operations area consisted of a metal warehouse that originally contained various pieces of equipment, a baghouse, two underground sumps, and a storage yard with a concrete pad. The metal warehouse was demolished and removed in 2011. The brick office building and the brick warehouse were also removed. The Pesses Site is bordered on the north by the Cenikor Drug Rehabilitation Foundation, on the east and much of the south by an active railway switching yard, and on the west by South Main Street. The Site is situated in a light industrial and commercial area. Morningside Drive borders the southern tip of the site. Residential areas are located approximately one half mile to the northeast and three-fourths mile southwest of the Site.



Operations to reclaim cadmium and nickel from dry-cell batteries and metal sludge began in 1979. The facility formerly included four furnaces fired by natural gas. The furnaces were heated to separate cadmium from the mixture in the form of cadmium oxide gas. The cadmium oxide gas was condensed into a liquid in condensers and then poured into molds. Furnace emissions were composed of numerous metal oxides and other particulates. These furnace emissions were conveyed to a cyclone separator and then to a baghouse filter before discharging to the atmosphere. In February 1980, cadmium emissions were measured as high as 2900 percent of the 0.01 pound per hour permit limits. In January 1981, the parent company claimed bankruptcy and operations at the Fort Worth plant were discontinued.

In 1983, an EPA removal action was conducted and the Site was secured. The removal action consisted of removal of 3,392 cubic yards of contaminated soil, metal sludge, drummed material, and debris from the Site. A two to six inch interim clay cover was installed over the process area. From two to six inches of topsoil were removed from inside the fenced area. Also, one inch of topsoil was removed from the south field where piles of slag were found and the surface soils along the roadside, railroad tracks and behind the warehouse were removed. To address remaining risks at the Site, in 1988 the EPA issued a Record of Decision, which

selecting stabilization of the contaminated soils and site contaminants, and capping as the remedy. The EPA selected this remedy because it removed the principal threat posed by the site conditions by eliminating the possibility of human exposure with the metal contaminants and by preventing spread of the contaminants.

## Current Status

---

All of the former buildings have been demolished and removed from the site. Remediation of the Site is complete. The wastes are stabilized and protected below a concrete cap. Protection of human health and the environment has been achieved.



The Site is currently undergoing operations and maintenance under TCEQ lead to maintain the integrity of the cap and site security. TCEQ conducts annual inspections of the site and also mows the site three to four times a year.

An Explanation of Significant Differences (ESD) was signed on May 14, 2007, to add institutional controls to the remedy for the site. The TCEQ prepared institutional controls as deed notices in accordance with the Texas Risk

Reduction Program (TRRP).

A Five-Year Review of the Site was completed on July 22, 2009. The Five-Year Review determined that the remedy for the Pesses Site is protective of human health and the environment. The next Five-Year Review Report is scheduled for completion by July 22, 2014.

## Benefits

---

Soil at the Site was formerly contaminated by cadmium and nickel contaminated sludge/powder. The excavation, stabilization, and capping of the metals contaminated soil eliminated direct human exposures and prevented runoff of contaminated surface water.

## National Priorities Listing (NPL) History

---

Proposal Date: October 15, 1984  
Final Listing Date: June 10, 1984  
Deletion Date: September 28, 1995

Population: Approximately 19,500 people live or work within one-mile of the former Site. Residential districts are located approximately one half mile to the northeast and three-fourths mile southwest of the site.

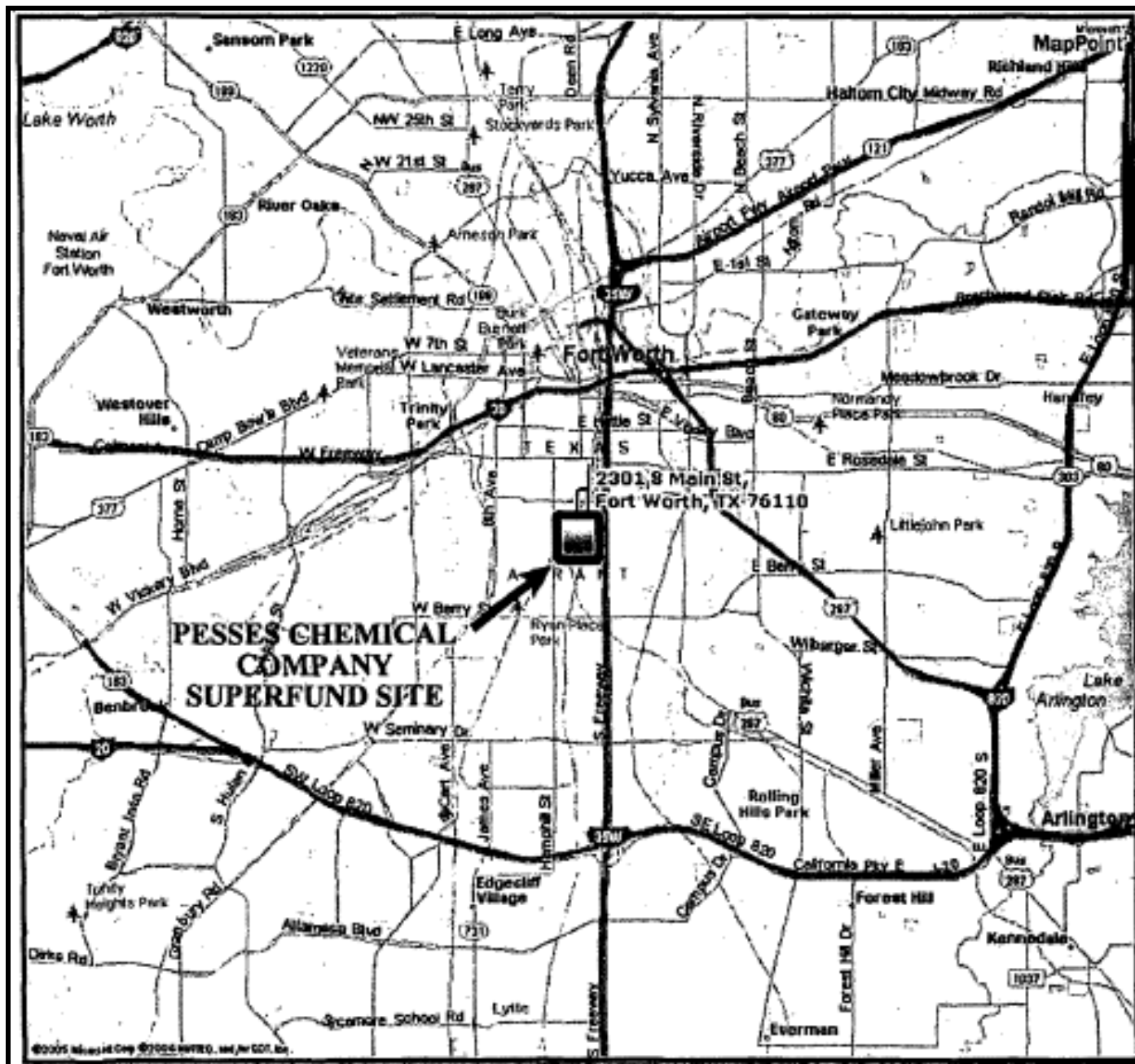
Setting: The former Site area covers approximately 4.2 acres. An office building and brick warehouse within the fenced portion of the Site are currently unoccupied. The former operations area consists of a metal warehouse that originally contained various pieces of equipment, a bag house, two underground sumps, and a storage yard with a concrete pad. The metal warehouse was demolished and removed in 2011.

The Pesses Site is bordered on the north by the Cenikor Drug Rehabilitation Foundation, on the east and much of the south by an active railway-switching yard, and on the west by South Main Street. The site is situated in a light industrial and commercial area. Morningside Drive borders the southern tip of the Site.

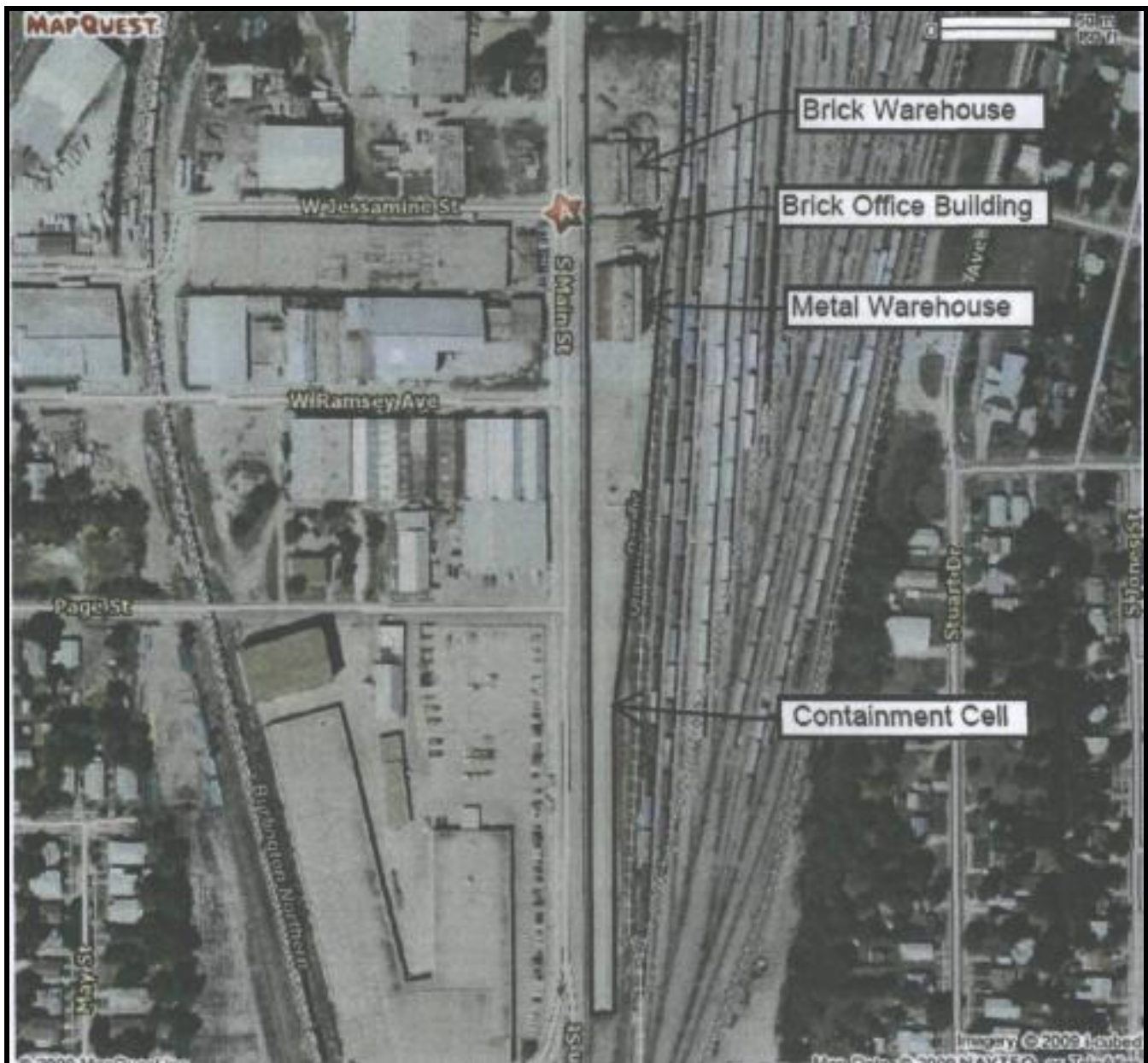
Photos: [Site photos](#)

Hydrology: The former Site is situated over the Paluxy Formation, a drinking water aquifer for the City of Fort Worth. The ground water depth is 380' below ground surface. The aquifer is below low permeability clay, shale, and a shaley limestone.

## Site Map







## Wastes and Volumes

---

Between 1979 and 1981, operations to reclaim cadmium and nickel from dry-cell batteries and metal sludges were conducted at the Site. The principal pollutants were metals including cadmium and nickel. The maximum measured concentration of cadmium in soil was 19,300 parts per million. Leaching of contaminants into ground water was unlikely due to the low permeability of area soils and clay lenses over the Paluxy Aquifer.

## Health Considerations

---

Prior to remediation, elevated levels of cadmium were detected up to 800 feet from the Site. Although none of the metals are cancer causing from direct contact or ingestion, adverse health effects could still occur from the levels of metals present on-site if remediation had not been completed.

For instance, an individual who contacted the metal contaminants present at the Site, and after continued exposure, might develop kidney or nervous system problems. Further, cadmium and nickel are carcinogens if inhaled. In other words, besides incidentally ingesting contaminants through hand to mouth interactions at an unremediated site, an individual might stir up soils or waste and inhale metal particles.

Because the ground water is below low permeability clay, shale and shaley limestone, and the maximum depth of Site contaminants is less than a depth of 13 feet, the EPA has determined that the ground water was not and will not, in the future, be affected by contamination at the Site.

The site's Environmental Indicator status is human exposure under control. The ground water under control Environmental Indicator does not apply since site ground water is not impacted.

## Record of Decision

---

The Record of Decision (ROD) was signed on December 22, 1988. The selected remedy including the following:

- In-Situ stabilization of soil contaminated with metals.
- Capping of the stabilized soil.
- Decontamination of the old warehouse.
- The soil cleanup goals are 15 mg/kg for cadmium and 100 mg/kg for nickel.

Construction completion was achieved on September 28, 1992. In 1988, a fence was built around the northern portion of the Site. Mobilization for Remedial Action began on January 27, 1992. A total of 12,359 cubic yards of contaminated soil were excavated and stabilized on site with one part cement kiln dust to nine parts of contaminated soil. The stabilized soil was placed in the South Field and covered with an 80 thousandths-of-an-inch (mil) thick high-density-polyethylene (HDPE) liner and 8-inches of reinforced concrete.

Some areas outside of the Pesses property lines were found to be contaminated. These areas were also excavated, stabilized, and placed under the cap. The excavated areas were backfilling with clean soil. The metal warehouse building and equipment were decontaminated by washing with high-pressure water. Wipe sample taken following the pressure washing confirmed that the building was sufficiently free of the contaminated dust.

Construction activities were completed in September 1992 and the Pesses Site was deleted from the National Priorities List (NPL) in 1995.

## Community Involvement

---

Community Involvement Plan:	Revised July 1989
Open Houses:	February 1985; December 1987; and June 1990
Proposed Plan and Public Meeting:	November 1988
Technical Assistance Grant:	Availability Notice – August 1989 No Final Applications received.
Information Repository:	Texas Commission on Environmental Quality Region 4 Office 2309 Gravel Fort Worth, Texas 76118

Attn: Nancy Johnson  
(817) 588-5862

## Site Contacts

---

EPA Remediation Project Manager:	Gary Miller	(214) 665-8318
State Project Manager:	Alan (Buddy) Henderson	(512) 239-1520
EPA Community Involvement and Regional Public Liaison:	Donn Walters	(214) 665-6483
State Community Relations:	Bruce McAnally	(512) 239-2141
EPA Toll-Free Telephone Number:		(800) 533-3508